

TEST REPORT

Test Report # 22W-019016 Date of Report Issue: November 29, 2022

Date of Sample Received: November 23, 2022 Pages: Page 1 of 18

CLIENT INFORMATION:

Company: Spector & Co.

Address: testing@spectorandco.com

SAMPLE INFORMATION:

Description: BALLPOINT PEN

Assortment: BLK/GRY/NVY/SLV/BKSV/BRN

PO No.:

Item No./Name: EC122

Item Class:

Factory/Supplier: USV016 Country of Origin: China

Country of Distribution: Canada, United States
Testing Period: 11/24/2022-11/29/2022

OVERALL RESULT:

PASS with information

Please refer to the following pages for test result summary and appropriate notes.

QIMA (HANGZHOU) TESTING CO., LTD.

Loremy. Xu

Jeremy Xu

RC-CSHZ-R063

Chemical Laboratory Supervisor





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TEST RESULTS SUMMARY:

RC-CSHZ-R063

At the request of the client, the following tests were conducted:

CONCLUSION	TEST(S) CONDUCTED
PASS	California Proposition 65, Total Lead in Paints and Surface Coatings
PASS	California Proposition 65, Total Lead in Substrate Materials
PASS	Canadian Surface Coating Materials Regulations SOR/2016-193, Total Lead and Mercury in Paints and Surface Coatings
PASS	Canadian Consumer Products Containing Lead Regulations (SOR/2018-83), Total Lead Content
PASS	California Proposition 65, Total Cadmium in Paints and Surface Coatings
PASS	California Proposition 65, Total Cadmium in Substrate Materials
Information only	Client's requirement, Total Nickel content
Information only	Client's Requirement, Total Tungsten content
PASS	CPSC 16 CFR 1307 Prohibition of Children's Toys and Child Care Articles Containing Specified Phthalates (DBP, BBP, DEHP, DINP, DHEXP / DnHP, DCHP, DIBP, DPENP)
PASS	California Proposition 65, Phthalates (DBP, BBP, DEHP, DINP, DIDP, DnHP)
PASS	Client's Requirement, Phthalates content



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DETAILED RESULTS:

California Proposition 65, Total Lead in Paints and Surface Coatings

Test Method: CPSC-CH-E1003-09.1

Analytical Method: Inductively Coupled Plasma-Optical Emission Spectrometry

Specimen No.	1+4+19	11	16+17+18			Limit
Test Item	Result	Result	Result	Result	Result	(mg/kg)
rest item	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(8/8/
Total Lead (Pb)	ND	ND	ND			90
Conclusion	PASS	PASS	PASS			

Note:

mg/kg =Milligrams per kilogram

LT = Less than

ND = Not detected (Reporting Limit = 15mg/kg)

Composite results are based on specimen of least mass resulting in highest potential concentration.

Remark:

The specification is quoted from client's requirement.

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DETAILED RESULTS:

California Proposition 65, Total Lead in Substrate Materials

Test Method: CPSC-CH-E1001-08.3 (Metal), CPSC-CH-E1002-08.3 (Non-Metal)
Analytical Method: Inductively Coupled Plasma-Optical Emission Spectrometry

Specimen No.	2+5+7	3	6+9+10	8	12+15+20	Limit
Test Item	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Total Lead (Pb)	25	ND	ND	ND	ND	100
Conclusion	PASS	PASS	PASS	PASS	PASS	

Specimen No.	13	14				Limit
Test Item	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Total Lead (Pb)	ND	ND				100
Conclusion	PASS	PASS				

Note:

mg/kg =Milligrams per kilogram

LT = Less than

ND = Not detected (Reporting Limit =15 mg/kg)

Composite results are based on specimen of least mass resulting in highest potential concentration.

Remark:

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DETAILED RESULTS:

Canadian Surface Coating Materials Regulations SOR/2016-193, Total Lead and Mercury in Paints and Surface Coatings

Test Method: ASTM F963-17 Clause 8.3.1

Analytical Method: Inductively Coupled Plasma-Optical Emission Spectrometry

Specimen No.	1+4+19	11	16+17+18			Total
Test Item	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Limit (mg/kg)
Total Lead (Pb)	ND	ND	ND			90
Total Mercury (Hg)	ND	ND	ND			10
Conclusion	PASS	PASS	PASS			

Note:

RC-CSHZ-R063

mg/kg=Milligrams per kilogram

LT = Less than

ND = Not detected (Reporting Limit: Pb=15 mg/kg; Hg = 10 mg/kg)



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DETAILED RESULTS:

Canadian Consumer Products Containing Lead Regulations (SOR/2018-83), Total Lead Content

Test Method: ASTM F963-17 Clause 8.3.1

Analytical Method: Inductively Coupled Plasma-Optical Emission Spectrometry

Specimen No.	1+4+19	2+5+7	3	6+9+10	8	Limit
Test Item	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Total Lead (Pb)	ND	25	ND	ND	ND	90
Conclusion	PASS	PASS	PASS	PASS	PASS	

Specimen No.	11	12+15+20	13	14	16+17+18	Limit
Test Item	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Total Lead (Pb)	ND	ND	ND	ND	ND	90
Conclusion	PASS	PASS	PASS	PASS	PASS	

Note:

RC-CSHZ-R063

mg/kg=Milligrams per kilogram)

LT = Less than

ND = Not detected (Reporting Limit = 15 mg/kg)



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DETAILED RESULTS:

California Proposition 65, Total Cadmium in Paints and Surface Coatings

Test Method: ASTM F963-17 Clause 8.3.1

Analytical Method: Inductively Coupled Plasma-Optical Emission Spectrometry

Specimen No.	1+4+19	11	16+17+18			Limit
Test Item	Result	Result	Result	Result	Result	(mg/kg)
rest item	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(8/8/
Total Cadmium (Cd)	ND	ND	ND			75
Conclusion	PASS	PASS	PASS			

Note:

mg/kg =Milligrams per kilogram

LT = Less than

ND = Not detected (Reporting Limit = 15 mg/kg)

Composite results are based on specimen of least mass resulting in highest potential concentration.

Remark:

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DETAILED RESULTS:

California Proposition 65, Total Cadmium in Substrate Materials

Test Method: ASTM F963-17 Clause 8.3.1

Analytical Method: Inductively Coupled Plasma-Optical Emission Spectrometry

Specimen No.	2+5+7	3	6+9+10	8	12+15+20	Limit
Test Item	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Total Cadmium (Cd)	27	ND	ND	ND	ND	75
Conclusion	PASS	PASS	PASS	PASS	PASS	

Specimen No.	13	14				Limit
Test Item	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Total Cadmium (Cd)	ND	ND				75
Conclusion	PASS	PASS				

Note:

mg/kg =Milligrams per kilogram

LT = Less than

ND = Not detected (Reporting Limit = 15 mg/kg)

Composite results are based on specimen of least mass resulting in highest potential concentration.

Remark:

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DETAILED RESULTS:

Client's requirement, Total Nickel content

Test Method: US EPA 3052:1996 & US EPA 6010D:2014

Analytical Method: Inductively Coupled Plasma-Optical Emission Spectrometry

Specimen No.	3+8	13+14				Limit
Test Item	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Total Nickel(Ni)	10436	91				
Conclusion	Information only	Information only				

Note:

RC-CSHZ-R063

mg/kg = Milligrams per kilogram

ND = Not detected (report limit = 30 mg/kg)



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DETAILED RESULTS:

Client's Requirement, Total Tungsten content

Test Method: US EPA 3052:1996 & US EPA 6010D:2014

Analytical Method: Inductively Coupled Plasma-Optical Emission Spectrometry

Specimen No.	3+8	13+14				Limit
Test Item	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Total Tungsten (W)	ND	ND				
Conclusion	Information only	Information only				

Note:

RC-CSHZ-R063

mg/kg = Milligrams per kilogram

LT = Less than

ND = Not detected (Reporting Limit = 15 mg/kg)



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DETAILED RESULTS:

CPSC 16 CFR 1307 Prohibition of Children's Toys and Child Care Articles Containing Specified Phthalates (DBP, BBP, DEHP, DINP, DHEXP / DnHP, DCHP, DIBP, DPENP)

Test Method: CPSC-CH-C1001-09.4

Analytical Method: Gas Chromatography with Mass Spectrometry

Specimen No.		1+4+19	2+5+7	6+9+10	11	Limit
Test Item	CAS No.	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Dibutyl phthalate (DBP)	84-74-2	ND	ND	ND	ND	1000
Benzyl butyl phthalate (BBP)	85-68-7	ND	ND	ND	ND	1000
Di-(2-ethylhexyl) phthalate (DEHP)	117-81-7	ND	ND	ND	ND	1000
Diisononyl phthalate (DINP)	28553-12-0 68515-48-0	ND	ND	ND	ND	1000
Di-n-hexyl phthalate (DHEXP / DnHP)	84-75-3	ND	ND	ND	ND	1000
Dicyclohexyl phthalate (DCHP)	84-61-7	ND	ND	ND	ND	1000
Diisobutyl phthalate (DIBP)	84-69-5	ND	ND	ND	ND	1000
Di-n-pentyl phthalate (DPENP)	131-18-0	ND	ND	ND	ND	1000
Conclusion		PASS	PASS	PASS	PASS	

Note:

RC-CSHZ-R063

mg/kg = Milligrams per kilogram

LT = Less than

ND = Not detected (Reporting Limit = 150 mg/kg)



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DETAILED RESULTS:

CPSC 16 CFR 1307 Prohibition of Children's Toys and Child Care Articles Containing Specified Phthalates (DBP, BBP, DEHP, DINP, DHEXP / DnHP, DCHP, DIBP, DPENP)

Test Method: CPSC-CH-C1001-09.4

Analytical Method: Gas Chromatography with Mass Spectrometry

Specimen No.		12+15+20	16+17+18			Limit
Test Item	CAS No.	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Dibutyl phthalate (DBP)	84-74-2	ND	ND			1000
Benzyl butyl phthalate (BBP)	85-68-7	ND	ND			1000
Di-(2-ethylhexyl) phthalate (DEHP)	117-81-7	ND	ND			1000
Diisononyl phthalate (DINP)	28553-12-0 68515-48-0	ND	ND			1000
Di-n-hexyl phthalate (DHEXP / DnHP)	84-75-3	ND	ND			1000
Dicyclohexyl phthalate (DCHP)	84-61-7	ND	ND			1000
Diisobutyl phthalate (DIBP)	84-69-5	ND	ND			1000
Di-n-pentyl phthalate (DPENP)	131-18-0	ND	ND			1000
Conclusion		PASS	PASS			

Note:

RC-CSHZ-R063

mg/kg = Milligrams per kilogram

LT = Less than

ND = Not detected (Reporting Limit = 150 mg/kg)



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DETAILED RESULTS:

California Proposition 65, Phthalates (DBP, BBP, DEHP, DINP, DIDP, DnHP)

Test Method: CPSC-CH-C1001-09.4

Analytical Method: Gas Chromatography with Mass Spectrometry

Specimen No.		1+4+19	2+5+7	6+9+10	11	Limit
Test Item	CAS No.	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Dibutyl phthalate (DBP)	84-74-2	ND	ND	ND	ND	1000
Benzyl butyl phthalate (BBP)	85-68-7	ND	ND	ND	ND	1000
Di-(2-ethylhexyl) phthalate (DEHP)	117-81-7	ND	ND	ND	ND	1000
Diisononyl phthalate (DINP)	28553-12-0 68515-48-0	ND	ND	ND	ND	1000
Diisodecyl phthalate (DIDP)	26761-40-0 68515-49-1	ND	ND	ND	ND	1000
Di-n-hexyl phthalate (DnHP)	84-75-3	ND	ND	ND	ND	1000
Conclusion		PASS	PASS	PASS	PASS	

Note.

mg/kg (Milligrams per kilogram) = 0.0001 % w/w (Percent by weight)

LT = Less than

ND = Not detected (Reporting Limit = 150 mg/kg)

Composite results are based on specimen of least mass resulting in highest potential concentration.

Remark:

RC-CSHZ-R063



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DETAILED RESULTS:

California Proposition 65, Phthalates (DBP, BBP, DEHP, DINP, DIDP, DnHP)

Test Method: CPSC-CH-C1001-09.4

Analytical Method: Gas Chromatography with Mass Spectrometry

Specimen No.		12+15+20	16+17+18			Limit
Test Item	CAS No.	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Dibutyl phthalate (DBP)	84-74-2	ND	ND			1000
Benzyl butyl phthalate (BBP)	85-68-7	ND	ND			1000
Di-(2-ethylhexyl) phthalate (DEHP)	117-81-7	ND	ND			1000
Diisononyl phthalate (DINP)	28553-12-0 68515-48-0	ND	ND			1000
Diisodecyl phthalate (DIDP)	26761-40-0 68515-49-1	ND	ND			1000
Di-n-hexyl phthalate (DnHP)	84-75-3	ND	ND			1000
Conclusion		PASS	PASS			

Note:

mg/kg (Milligrams per kilogram) = 0.0001 % w/w (Percent by weight)

LT = Less than

ND = Not detected (Reporting Limit = 150 mg/kg)

Composite results are based on specimen of least mass resulting in highest potential concentration.

Remark:

RC-CSHZ-R063



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DETAILED RESULTS:

Client's Requirement, Phthalates content

Test Method: CPSC-CH-C1001-09.4

Analytical Method: Gas Chromatography with Mass Spectrometry

Specimen No.		1+4+19	2+5+7	6+9+10	11	Limit
Test Item	CAS No.	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Dibutyl phthalate (DBP)	84-74-2	ND	ND	ND	ND	1000
Benzyl butyl phthalate (BBP)	85-68-7	ND	ND	ND	ND	1000
Di-(2-ethylhexyl) phthalate (DEHP)	117-81-7	ND	ND	ND	ND	1000
Diisononyl phthalate (DINP)	28553-12-0 68515-48-0	ND	ND	ND	ND	1000
Diisodecyl phthalate (DIDP)	26761-40-0 68515-49-1	ND	ND	ND	ND	1000
Di-n-hexyl phthalate (DHEXP / DnHP)	84-75-3	ND	ND	ND	ND	1000
Di-n-octyl phthalate (DNOP)	117-84-0	ND	ND	ND	ND	1000
Diethyl phthalate (DEP)	84-66-2	ND	ND	ND	ND	1000
Diisobutyl phthalate (DIBP)	84-69-5	ND	ND	ND	ND	1000
Dicyclohexyl phthalate (DCHP)	84-61-7	ND	ND	ND	ND	1000
Di-n-pentyl phthalate (DPENP/DnPP)	131-18-0	ND	ND	ND	ND	1000
Conclusion	Conclusion		PASS	PASS	PASS	

Note:

mg/kg (Milligrams per kilogram) = 0.0001 % w/w (Percent by weight)

LT = Less than

ND = Not detected (Reporting Limit = 150 mg/kg)

Composite results are based on specimen of least mass resulting in highest potential concentration.

Remark:

RC-CSHZ-R063



Test Report # 22W-019016 Pages: Page 16 of 18

DETAILED RESULTS:

Client's Requirement, Phthalates content

Test Method: CPSC-CH-C1001-09.4

Analytical Method: Gas Chromatography with Mass Spectrometry

Specimen No.		12+15+20	16+17+18			Limit
Test Item	CAS No.	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	Result (mg/kg)	(mg/kg)
Dibutyl phthalate (DBP)	84-74-2	ND	ND			1000
Benzyl butyl phthalate (BBP)	85-68-7	ND	ND			1000
Di-(2-ethylhexyl) phthalate (DEHP)	117-81-7	ND	ND			1000
Diisononyl phthalate (DINP)	28553-12-0 68515-48-0	ND	ND			1000
Diisodecyl phthalate (DIDP)	26761-40-0 68515-49-1	ND	ND			1000
Di-n-hexyl phthalate (DHEXP / DnHP)	84-75-3	ND	ND			1000
Di-n-octyl phthalate (DNOP)	117-84-0	ND	ND			1000
Diethyl phthalate (DEP)	84-66-2	ND	ND			1000
Diisobutyl phthalate (DIBP)	84-69-5	ND	ND			1000
Dicyclohexyl phthalate (DCHP)	84-61-7	ND	ND			1000
Di-n-pentyl phthalate (DPENP/DnPP)	131-18-0	ND	ND			1000
Conclusion		PASS	PASS			

Note:

mg/kg (Milligrams per kilogram) = 0.0001 % w/w (Percent by weight)

LT = Less than

ND = Not detected (Reporting Limit = 150 mg/kg)

Composite results are based on specimen of least mass resulting in highest potential concentration.

Remark:

RC-CSHZ-R063



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SPECIMEN DESCRIPTION:

RC-CSHZ-R063

Specimen No.	Specimen Description	Location
1	Grey coating	Barrel (grey style)
2	Black plastic	Inner pipe of barrel (grey style)
3	Silvery metal	Clip (grey style)
4	Silvery coating	Clip (grey style)
5	White plastic	Clip (grey style)
6	Silvery plated grey plastic	Button (grey style)
7	White plastic	Button inner (grey style)
8	Silvery metal	Spring of button inner (grey style)
9	Silvery plated grey plastic	Tip (grey style)
10	White plastic	Cartridge (grey style)
11	Blue ink	Cartridge (grey style)
12	White plastic	Cartridge tail (grey style)
13	Silvery metal	Nib (grey style)
14	Silvery metal	Cartridge spring (grey style)
15	White plastic	Top gear (grey style)
16	Black coating	Barrel (black style)
17	Navy coating	Barrel (navy style)
18	Brown coating	Barrel (brown style)
19	Transparent lacquer	Barrel (all natural styles)
20	Black plastic	Clip (black clip style)



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SAMPLE PHOTO:

RC-CSHZ-R063





-End Report-